

INNOVATIONS: UNDER-TRIAGE

Emergency departments typically tackle throughput problems by reconfiguring physical spaces and implementing process changes to move patients more rapidly from triage to the area of the hospital where they can get the most appropriate care. These modifications help tremendously when a patient's initial acuity assessment is accurate, but unfortunately they're useless when a bad assessment sends a patient down the wrong clinical path.

Lisa Wolf, PhD, RN, CEN, FAEN, a clinical assistant professor of nursing at the University of Massachusetts in Amherst, is trying to draw attention to the phenomenon of "under-triage." Simply put, under-triage occurs when patients presenting to the ED are initially assessed to be less ill than they truly are. The patients most often under-triaged, notes Wolf, are those who receive a 3—urgent but stable—under the ESI. Patients assigned a 4 or 5 are typically the "walking wounded," while those assigned a 1 or 2 get the fastest attention. The patients who are under-triaged often get assessed as Level 3 because instability indicators are missed or go unexamined.

"These patients are often labeled as stable," says Wolf, "because they have a complaint that makes them unable to go to a fast-track area, or they may need multiple resources, like radiography, labs, and procedures, but the nurse thinks they are not likely to decompensate."

"The patient's initial acuity assessment sets the trajectory for the entire ED visit," says Wolf. "If a patient goes from the triage nurse to the receiving nurse as a 3, then there will be a presumption that this patient is not in danger, and the staff's attention will be directed elsewhere. In fact, the stability an ESI designation of 3 indicates means doctors and nurses do not revisit the assessment unless the patient's condition deteriorates, requiring additional and immediate care."

Wolf observed this correlation between under-triage and delayed treatment during a research project in 2009. To learn more about factors affecting the transfer of ED patients to the ICU, Wolf and a student reviewed the charts of 75 patients transferred directly from the ED to the ICU during a three-month period at a 142-bed acute-care hospital. The patients were triaged using ESI; none of the 75 patients was given a 4 or 5. Of the 44 patients who experienced "delayed transfers"—defined as being in the ED

longer than the department's four-hour throughput goal—the most significant factor affecting transfer time was the initial triage acuity assignment, Wolf says.

Significantly, 19 of the 25 patients with ESI assignments of 3 were delayed, and these 19 constituted 43.2 percent of the total number of delayed patients. Of the conditions these patients presented with, those with sepsis were the most likely to be under-triaged and delayed, with respiratory failure coming in second. Wolf said the symptoms of these two conditions, such as fatigue and nausea, can be attributed to many health problems, thus making them harder to spot.

While the chart review identified other possible contributing factors to delays—such as the possibility that mode of arrival and gender may have contributed to the triage acuity assignment because walk-ins were delayed more than those arriving in ambulances, and women were delayed more than men—they made nowhere near the impact on delay as the initial acuity ranking did.

In that case, what's causing under-triage and the diminished treatment outcomes it presents? In Wolf's opinion, the problem is two-fold, concerning both communication and geography. In the case of geography, under-triaged patients typically are sent for care to non-acute departments within the hospital, says Wolf. That initial assessment of 3 "colors the way every subsequent clinician sees the patient."

"Communication issues among ED staff can be a problem," says Wolf. "In addition, there appears to be an over-reliance on intuition and an under-reliance on physiologic cues among triage nurses attempting to determine acuity."

The most "accurate" ED nurses, Wolf believes, are those who operate at the highest level of moral reasoning: They do what they do for the good of their patients. These nurses constantly modify their treatment—even if it means deviating from ED rules—to act in the best interests of their patients. These are the nurses least likely to under-triage.

Because in Wolf's opinion the majority of nurses don't function at this very high level to prevent under-triaging, the ED protocols must be "very, very good" and make extra, probing questions in the face of nonspecific symptoms standard operating procedure. Wolf's research also has led her to reject the commonly held belief among ED

administrators that the most experienced nurses should head up triage because “experience,” she says, may mean only that a nurse has been thinking the wrong way for the longest amount of time.

“For triage, you don’t want your most experienced nurse—you want your best nurse,” she says.

Wolf believes that under-triage is occurring almost universally in EDs across the country and is off the radar of most EDs. Even the hospitals where she conducted several under-triage studies, she says, have made no process changes to address under-triage in the wake of her findings. However, she believes that education and culture change can help eliminate under-triage and improve ED patient outcomes.

In mentoring young nurses, Wolf has found it effective “to frame the clinical day around what’s best for the patient, so that rather than focusing on the completion of tasks, we view these tasks as a means to an end. We try to encourage them to see all nursing actions as ethical decisions, so that the patient is better off at the end of a nurse’s shift than they were at the beginning.” Wolf even asks the nurses under her tutelage to write journal entries in the middle of their shift so they can act on their insights during the second half of their day. It’s critical that ED leadership support this paradigm, Wolf stresses.

“I can train the heck out of nurses, and within six weeks they’re ruined if they’re in a bad environment,” she said. “Nurses and doctors have to train and practice together, a clinical nurse specialist or educator should be available during all ED shifts, and each ED nurse has to believe they and they alone are responsible for all decisions they make. Unit culture is huge.”

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